II.—THE MODES OF CONDITIONAL THOUGHT.

III.

1.

Having considered the question of the order of the two concept-groups most intimately concerned in a conditional thought-period, it now remains to examine somewhat closely into the nature of the act of intellection that binds the two together; the precise nature of this act of intellection determines the mode of the conditional thought.

It should perhaps be made clear at the very outset that the act of intellection that binds together the groups of a conditional thought-period is in no way peculiar—it is identical in kind with that which binds together the groups of other periods. To illustrate, suppose a general has left an officer in command of a town with directions to keep a certain signal flying at the cost of his life, if need be. As he returns to relieve this officer a messenger comes in with the news that the flag is down. The general's thought will instantly leap to the inference to be drawn from this state of affairs reported, namely, that the officer is dead. If for any reason he is not assured of the reliability of the news, his course of thought would naturally be indicated by the words,

"If that is so (i. e., if the flag is down), my officer is dead".

The act of intellection that binds together the thought of the flag's being down and the thought of the officer's being dead is obviously a simple act of inference—the speaker judges that the first presupposes the second. Such an act of inference is not in any way peculiar to conditional thinking, but is common in all kinds of thought. What is true of the act of intellection that binds together the concept-groups in this case is true in all other conditional periods. The reader will have an opportunity to test the truth of this statement for himself later when the different modes of conditional thought are taken up; meantime this one case will serve as an illustration of the general principle.

The real peculiarity of the conditional thought-period which distinguishes it from other thought-periods is the quality of its concept-groups; in other respects (the subject-matter of the groups and the act of intellection that unites them) the conditional thought-period is identical with thought-periods of other kinds. For suppose that the general above referred to marches to the relief of his officer without meeting any messenger by the way; instead a sudden turn in the road brings him in sight of the town, and his first observation is that the signal is not flying. He will instantly draw the same inference as before,—the death of his officer. He would not be apt to express himself so formally, but the course of his thought, exactly stated, would be

"The flag is down; therefore my officer is dead".[1]

The difference between this and the course of thought which underlies the sentence

"If that is so (i. e., if the flag is down), my officer is dead"

lies simply in the quality of the concept-groups; in the first case the speaker feels that he is dealing with facts—he sees that the flag is down, and is convinced that his officer is dead; while in the conditional period his groups are strongly colored by the lack of assurance that they correspond to actual fact—he does not know that the flag is down, and is therefore not assured of the death of his officer. But except for that peculiarity in the quality of the groups of the conditional thought-period the two courses of thought are identical; for the concept-groups in each case deal with the same subject-matter (the flag's being down and the officer's being dead), and in both cases the speaker passes from one group to the other by an identical act of inference—he judges that the flag's being down presupposes the death of his officer. To avoid any possible ambiguity, it should perhaps be definitely stated that the *certainty* with which the inference is drawn is exactly the same in both the cases just described—in the conditional period the general's lack of assurance

[1] A natural form of verbal expression would be an exclamation, "My officer is dead". This form gives full expression only to the second group—the inference. In speaking to someone who did not understand the situation he would be apt to add a statement of the ground of the inference (contained in his first group); "My officer is dead; for the flag is down".

that the flag is down does not in the slightest degree affect the certainty of his judgment that its being down implies the death of his officer. This is simply another way of saying that we reason just as certainly about a supposed case as we do about admitted facts.[1]

There may be still a lingering doubt about the validity of the claim that I am trying to make good, namely, that the act of intellection that binds together the concept-groups in a conditional thought-period is identical with the act that binds together the groups of other thought-periods. For it might be said in objection that when these other thought-periods find ingenuous expression in speech, the varying nature of the act of intellection that binds together the groups betrays itself in some characteristic word like "Since", "When", "Because", etc., and therefore that it would seem antecedently probable that the use of "If" in the expression of a conditional thought-period indicates a connecting act of intellection different from that in any of the other thought-periods. But this argument is not valid, for the function of "If" is not parallel to that e. g., of "Since", as may be clearly seen by taking a concrete example and applying what has already been said above. Thus suppose a course of thought that would find natural expression in the words

"Since he has done his best, no more will be required".

In this sentence "Since" gives expression to the fact that there is a connection between the speaker's concept-groups, and further, it signifies the nature of that connection—the apprehension of a cause and effect relation. But suppose a parallel train of thought that would find ingenuous expression in

"If he has done his best, no more will be required".

Here "If", like "Since", gives expression to the fact that there is a connection between the speaker's concept-groups, and further, unlike "Since", it indicates the peculiar character of

[1] Any uncertainty about the validity of the inference would spring from a doubt of the faithfulness of the officer to his trust, and would affect both thought-periods equally. In the verbal expression this uncertainty might betray itself by the use of "probably" or the like;

"My officer is *probably* dead; for the flag is down".
"If the flag is down, my officer is *probably* dead".

the concept-groups themselves, i. e., that they have the coloring of lack of assurance characteristic of the conditional thought-period. The force of the word is expended in this way, for there are several modes of conditional thought, and it has to be left to the hearer to guess that the act of intellection that binds together the groups in this particular case is the apprehension of a cause and effect relation. Since then it is not the function of "If" to give expression to the nature of the act of intellection that binds together the groups of a conditional thought-period, obviously no inference can be drawn as to the nature of that act of intellection from the fact that this word is the subordinating conjunction of the conditional sentence. The failure to grasp the real function of the conditional particle, probably in large measure accounts for the scanty attention given to the act of intellection that binds together the groups of the conditional thought-period, and for the lack of a clear description of its varieties, i. e., of the modes of conditional thought.[1]

From what has been already said, it is very easy to understand the often noted interchange in speech of conditional and other subordinating particles. For it has been shown that two courses of thought may be identical except that in one case the concept-groups exhibit the quality characteristic of the conditional thought-period. Two such courses of thought would find natural expression in the following pair of sentences:

> "Since he has done his best, no more will be required".
> "If he has done his best, no more will be required".

Assuming that the speaker is giving ingenuous expression to his thought, he will use one form or the other according as he is sure or lacks assurance that the person in question has done his best, and consequently that nothing more will be required of

[1] To indicate these in speech it would be necessary to have a sort of compound conjunction, one part (like "If") unchanging, to denote the peculiar quality of the groups of the conditional thought-period, the other varying according to the nature of the act of intellection joining the groups. The varying second part of the compound would correspond in function to "Since", "When", "Because", etc.; for these latter are left free to indicate the nature of the act of intellection which binds together the groups in the thought-period in whose verbal expression they appear by the fact that they all take for granted that there is nothing peculiar in the nature of the concept-groups themselves, i. e., their use presupposes that the speaker is dealing with what he knows or believes to be facts.

him. This distinction appears so clear-cut at first sight that there might seem to be no excuse for inconsistency in the use of two words like "Since" and "If", provided that the speaker were to give exact expression to his thought. But it must be remembered that the line between human certainty and uncertainty is not fixed and unvarying; with the same subject-matter and exactly the same evidence before him, the optimist might feel certain, and thus justified in saying "Since", while the lack of assurance of the pessimist left nothing open to him but "If". A similar observation might be made with reference to a single individual if he were taken at times of widely varying moods. However, any inconsistency in the use of conditional and other subordinating particles arising from this source is only a reflex of inconsistency in thought, and probably exerts little influence in producing the real confusion that does exist in the use of these words. A much more potent factor is the attempt of the speaker to hide his real thought, either by choosing the form of speech that implies lack of assurance when he is sure, or the formula of certainty when he really lacks assurance. As an example of the latter we may take the case of a man of broken fortune who has little hope of making good his losses; despite his lack of assurance that amounts almost to despair, he may yet say to his family "*When* I regain my fortune, we will do thus and so". This form of speech he assumes to encourage them; his own thought really justifies nothing stronger than "If". The converse process—the use of the formula that implies lack of assurance when one is sure—is very common. The reason is, I suppose, that the speaker in this way secures a modest form of expression. Such a use appears when, in asking a favor, the speaker wishes to support his claim by a reference to past services rendered by himself to the hearer; the use of the conditional particle gives the impression of virtuous self-depreciation. Thus in Homer (Il. i. 39 ff.) the priest Chryses prays to Apollo, "*If* I have ever roofed over a temple pleasing to thee, or *if* ever for thee I have burned the fat thigh-pieces of bulls and goats". A similar form of modesty is found in the expression "If this is so"; these words are often used when the speaker is sure of his premise, but by expressing himself in this way he seems to lead the hearer to a conclusion, whereas "Since this is so" would seem to force him to it, and thus might rouse his antagonism. As

soon as uses like these become conventional something like a real interchange of subordinating particles has taken place; e. g., the phrase just quoted ("If this is so") becomes a mere commonplace in formal argument—it is often used when the speaker has no feeling that he is understating his certainty, and the audience is not misled on that point by the use of the formula he employs; he means, and they gather from his words, just what would be conveyed by "Since this is so". From such uses it is but a short step to passages in which there is found a conditional particle used side by side with a subordinating conjunction of another sort as an exact synonym of the latter; the following seems to be a case in point:

Hor. Ep. II. 2. 175 ff.:

> Sic, *quia* perpetuus nulli datur usus, et heres
> Heredem alterius velut unda supervenit undam
> Quid vici prosunt aut horrea? Quidve Calabris
> Saltibus adiecti Lucani, *si* metit Orcus
> Grandia cum parvis, non exorabilis auro?

In this passage we should not far miss the sense if both *quia* and *si* were rendered by "in view of the fact that"; for Horace himself can hardly be less sure that death reaps great and small than he is that a perpetual lease is given to none—these are merely two aspects of the same thought, and, on the other hand, *si* can hardly be chosen to secure a modest form of expression, for the formula of assurance above (the *quia*-clause) refers to practically the same subject-matter. Finally the metre does not force the writer to the use of *si*, for though *quia* could not stand in the line as arranged, *cum* (*metat*) might have been used at that point. The reason, therefore, for the choice of *si* is not obvious, unless it be the avoidance of *cum* . . . *cum* (*parvis*), or that Horace, as he impresses his lesson by asking substantially the same question twice, carries out the variety of verbal expression even to the detail of the subordinating conjunction, finding in *si* a more striking variant on *quia* than *cum* would have been.

In describing the modes of conditional thought the examples supposed are Consequence rather than Proviso Periods; for the latter order of conditional thought is but a subsidiary development of the former, as I have tried to show in a preceding paper, and further, its groups are not closely contiguous as in the case of the Consequence Period. A discussion of the effects

of the Proviso order on the modes of conditional thought would be interesting from the point of view of psychology, but it seems to offer little for the purposes of syntax, and is not attempted here. In terms of the Consequence Period the problem is, What relations may a person apprehend between two possibilities such that he feels that the realization in fact of one of them entails the realization in fact of the other? At least three such relations are to be distinguished; (1) a cause and effect relation, (2) a relation of ground and inference, and (3) a relation of equivalence. The subsequent discussion follows this order.

2.

THE CAUSE AND EFFECT RELATION.

Conditional periods whose groups are bound together by the apprehension of a cause and effect relation may be defined as judgments that the coming to pass of one event is (will be, etc.) followed by the coming to pass of another. All such judgments are applications to a particular case of generalizations based, for the most part, on our preceding experience. Thus we are not slow to learn that the hand thrust into the fire is burned. This generalization puts us in a position to forecast the outcome when we see a child apparently planning to touch the fire, and our thought finds expression in such sentences as

"If you do that, you will be burned".

The conditional periods which fall within the first class may be subdivided into two groups; for the phrase "cause and effect relation" has a broad meaning, being sometimes used of real cause and effect, sometimes of immediate cause and effect (an immediate cause being one that merely precipitates the effect of the real cause). According as it is a real or immediate cause that is apprehended in the act of intellection that binds together the groups of a conditional thought-period, the period may be styled Conditional-Causal or Conditional-Circumstantial respectively.

(a). Conditional-Causal Periods.

Suppose that a child is tempted to do wrong; he judges on the basis of his past experience that the commission of the proposed

act will be followed by punishment—a clear case of real cause and effect. His thought might be thus expressed:

"If I do this, I shall be punished".

The same mode of conditional thought underlies the following sentence

"If he has done his best, no more will be required".

Whenever there is any doubt about the mode of conditional thought underlying a given sentence, a practical test may be applied by asking ourselves how the speaker would have expressed himself if his concept-groups had not been colored by the lack of assurance about realization in fact characteristic of the conditional thought-period. By discarding this element that alters the quality of the concept-groups we do not at all affect the act of intellection which links the groups together (see section 1), but we thus find ourselves forced to a form of verbal expression in which we must take ground as to the nature of that act of intellection. Thus in the first case above, suppose the child determined to commit the act. When it occurs to him that the commission of the deed entails punishment, his course of thought would be expressed by

"I shall be punished *for doing this*".

So, in the other case, the removal of the lack of assurance that colors the concept-groups produces

"Since he has done his best, no more will be required".

These forms of verbal expression indicate clearly the nature of the act of intellection that binds together the concept-groups of the corresponding conditional periods.[1]

(b). Conditional-Circumstantial Periods.

Suppose that a child has already done something wrong and

[1] Instead of "I shall be punished for doing this", we might conceivably say "Since I shall do this, I shall be punished", but one doubts whether that is good English; for "Since" seems not much used referring to the realm of the future. Quite often, as in the other example, the assumption of realization in fact for the subject-matter of the concept-groups calls for verbal expression in a hypotactic period, and when this is the case, the door is open (as noted in section 1) for an interchange in the use of the conditional and other subordinating particles.

proposes to confess it at once. A companion sees that punishment will follow such a course, and might say

"If you tell, you will be punished".

Here the cause is only immediate—the child will not be punished for telling, but his confession will precipitate the result of the real cause (the commission of the wrong). We may apply here the the test above suggested for bringing out more clearly the nature of the act of intellection that binds the groups together. Assuming the second child has no doubt that the first will carry out his design of confessing what he has done, his thought may find expression in

"When you tell, you will be punished".

Under this head of cause and effect relation fall all the periods that have an element of will or wish in the conditioned group. This element most often produces conditional sentences whose apodoses are expressions of determination with regard to the speaker's own action, or commands and exhortations addressed to others. When the conditioned group is thus modified, the act of intellection that joins the groups is less distinctly a judgment—the speaker no longer judges that the coming to pass of one event is (will be, etc.) followed by the coming to pass of another, but rather he wills or wishes such a sequence. Here too are found the Conditional-Causal and Conditional-Circumstantial types.

(a). Conditional-Causal Periods.

Suppose that the parent of the child above referred to is informed from a not very reliable source that the boy has done the wrong in question; he may however determine on a course of action, and his thought find expression in

"If he has done that, I will punish him".

Remove the uncertainty about the truth of the message, and the verbal form becomes

"I will punish him for this".

This form of speech again shows clearly the nature of the act of intellection that binds together the groups in both cases. To illustrate again, suppose that both parents hear the doubtful

report, and that it suggests to one a certain course of action; to delegate this to the other the verbal form might be

"If he has done that, punish him".[1]

(b). Conditional-Circumstantial Periods.

Suppose that A says to B, "C may pass by here this morning"; this reminds B that he wishes to interview C, and he may say

"If he does, I will stop him".

On the other hand, if A states without reservation that C will pass and B believes it, his verbal expression will be

"I will stop him as (when) he passes.

The real reason for stopping C is that B wishes to interview him—not the mere fact of his passing by that way; the latter is but the immediate cause—it gives the real cause a chance to produce its effect. An example with an imperative apodosis appears if we suppose that when A says "C may pass here this morning", B delegates his interest to A with the words

"If he does, stop him".[2]

It may be said in general of the conditional periods that show

[1] In the use of the first person of the verb the speaker may express will directly, or he may simply predict his own action as he might that of another person. In trying to arrive at the thought underlying conditional sentences it is sometimes difficult to tell which of these meanings is to be attached to the first person of the verb. The matter is still further complicated because it is quite possible that the two things—direct expression of will and statement of fact—are united in many cases. Genuine imperative expressions (as in the last example above) are not, and cannot be, statements of fact or belief; hence when they appear in apodosis they provide better and clearer illustrations for the conditional thought-period with an element of will in the conditioned group.

[2] It may be of interest to note in passing that an element of will in the conditioned group does not always result in a verbal form that we count a direct expression of will; for the group may be further colored by a feeling of modesty, politeness or the like. The speaker then will say e. g., "when he passes, I *wish* you would stop him." So also a speaker whose feelings urge him to exhort may content himself with a formula of advice, as a matter of diplomacy or for other reasons: "If that is so, you had best proceed as follows." An element of will does not always figure in the thought that underlies such a sentence as this last; for a statement of propriety or duty may be the outcome of the most dispassionate and disinterested judgment on the part of the speaker.

the cause and effect relation that they belong mostly to the realm of the present and the future; this is particularly true of those which have an element of will or the like in the conditioned group, for man cannot well will the past to be different than it is. Even in the case of those periods whose conditioned group contains no such element, examples are rare in which both concept-groups deal with the past; e. g.,

"If he did that, he has been punished".

It may be noted also that this first mode of conditional thought described accounts for the great majority of conditional sentences.

3.

THE GROUND AND INFERENCE RELATION.

Conditional thought-periods whose groups are bound together by the apprehension of a ground and inference relation may be defined as judgments that the coming to pass of one event *presupposes* an antecedent state of affairs; in such a case we reason backward from effect to cause, and our judgment here again is, for the most part, an application to a specific case of a generalization based on past experience. To this type of conditional thought-period is given the name

Conditional-Inferential.

To illustrate, suppose that a person who has arrived at the generalization that after a night rain the flowers are fresh, is told on any particular morning that the flowers outside seem fresh; if he does not trust the powers of observation of the informant he might say

"If the flowers are fresh, it rained last night".

On the other hand he might himself glance out of the window and note the condition of the flowers; he would draw the same inference as before, and free from the lack of assurance that characterized his concept-groups in the former course of thought, he might say

"It rained last night; for the flowers are fresh".

The latter form of verbal expression indicates very clearly the nature of the act of intellection that binds together the groups

in each of the thought-periods—it is an act of inference, a judgment that one state of affairs presupposes another.

The same generalization, if the train of thought starts from the other end, will furnish the basis for a Conditional-Causal Period. Thus suppose that the person above referred to hears that it probably rained in the night; he will apprehend the result entailed, and his thought may be thus expressed

"If it rained last night, the flowers are fresh".

The difference in the act of intellection that binds together the concept-groups in this conditional thought-period and that which unites the groups in the thought underlying

"If the flowers are fresh, it rained last night".

may be further accentuated by contrasting the thought of the following sentences which shows a like difference:

"The grass is green *because* the sun shines here".
"The sun shines here, *since* the grass is green".

The difference may be again illustrated by comparing the two following conditional sentences, the first of which is the expression of a Conditional-Causal Period, and the second of a Conditional-Inferential:

"If there is water in that valley, there is also vegetation".
"If there is vegetation in that valley, there is also water".

The distinction between real and immediate cause in this mode of conditional thought is not important enough to call for separate names for the thought-periods according as it is one or the other that is involved in them. Further, there cannot well be an element of will or the like in the conditioned group, for it is a matter of hard and cold reasoning—the speaker simply judges that one event presupposes another. In Plautus there is but scanty evidence of this mode of conditional thought; it is common enough in an age of more formal thinking.

4.

The Relation of Equivalence.

If we should seek a set formula to express the act of intellection that binds together the concept-groups in the two modes of con-

ditional thought thus far described, for the Conditional-Causal Periods it would be "A *is followed* by B", and for the Conditional-Inferential "A *presupposes* B". In this third mode of conditional thought the judgment is of the form "A *is* B", i. e., the subject-matter of the conditioning group is defined or characterized by the subject-matter of the conditioned group. Accordingly I suggest for the conditional periods that fall under this heading the name

Conditional-Defining Periods.

Suppose that A reports to B that C proposes to commit some act of cruelty. B passes judgment on the act, and the course of his thought might find expression in

"If he does that, it will be a shame".

Similar intellection underlies the following sentence

"If you are obedient to your father, you are doing the right thing".

Taking away the lack of assurance that colors the concept-groups in this case, the verbal expression becomes a hypotactic period whose introductory word indicates the nature of the act of intellection that binds together the groups

"In that you are obedient to your father, you are doing the right thing".

Evidence of this mode of conditional thought is abundant in Plautus. The conditioned group cannot of course contain an element of will or the like; it is another case of judgment pure and simple.

The name "Conditional-Defining" as a description of the conditional thought-periods that fall under this heading calls perhaps for a word of explanation. In naming the periods that exhibit the other modes of conditional thought it was possible to accept the terms that formal grammar would naturally choose as designations for the conditional sentences through which these modes of conditional thought are suggested to the hearer. But the term that would naturally be applied in grammar to the sentences by which a Conditional-Defining thought-period is suggested to the hearer could hardly fail to produce confusion if applied to the thought-period. Take, for example, some conditional sentences from Plautus which convey this mode of conditional thought:

Bacch. 1165:

si amant, sapienter faciunt.

Curc. 144:

magnum inceptas, si id expectas quod nusquamst.

Men. 126:

si foris cenat, profecto me, haud uxorem, ulciscitur.

Men. 805:

male facit, si istuc facit.

Tri. 279 ff.:

feceris par tuis ceteris factis,
patrem tuom si percoles per pietatem.[1]

The *si*-clauses in these sentences will at once appeal to the student of Latin as parallel to *quod-* and *cum*-clauses that grammar has named "explanatory" or "explicative", and it would seem natural to apply these adjectives also to them. But such a designation would not answer for the conditional sentences that show the mode of conditional thought under discussion; for it would seem to imply that the conditioning group in the underlying thought explained or amplified the conditioned group. Almost the reverse is true—it is the conditioned group that characterizes or defines the conditioning group; or, to put it in another way, it is the subject-matter of the conditioning group on which judgment is passed; e. g., (as above)

"If he does that, it will be a shame".

[1] Other illustrations may be found in Plautus, Amph. 198, 675, Cas. 997, Men. 760, Merc. 874, Mil. 694, Tri. 1173; Cic. ad Fam. III. 3. 2, III. 6. 6, III. 7. 5, XIII. 23. 2, p. Clu. 50, 139, in Cat. I. 11. 28, II. 3. 6, p. Mur. 3. 5, 30. 62, p. Sulla 3. 8, p. Arch. 10. 23; Livy, XXI. 11. 2; Pliny, Ep. VII. 33, 3; Hor. Ep. II. 1. 3 ff., II. 1. 64 ff. cf. Soph. Oed. Tyr. 549 ff.:

εἰ τοι νομίζεις κτῆμα τὴν αὐθαδίαν
εἶναί τι τοῦ νοῦ χωρίς, οὐκ ὀρθῶς φρονεῖς.

The conditioning group may find expression in an infinitive; e. g.,

Cic. ad Att. VIII. 3. 7;

non puto etiam hoc Gnaeum nostrum commissurum, ut Domitium relinquat; etsi . . .; sed turpe Domitium *deserere* erit implorantem eius auxilium.

That "to desert him will be base" is equal to "If he deserts him, it will be base" is shown by what precedes—Cicero is not assured that Pompey will desert Domitius, in fact he says he thinks he will not. Cf. Plautus, Cist. 42, Tri. 119; Pliny, Ep. IV. 13. 4; Cic. Lael. 11. 39.

To avoid any confusion that might thus arise, the name Conditional-Defining has been given to the thought-period.[1]

In attacking a pile of conditional sentences it will be found much easier to pass judgment on the mode of the speaker's conditional thought than it was to determine the order of that thought; for the test is much more tangible in this case, and

[1] As for the conditional *sentence* through which this mode of conditional thought is suggested to the hearer, it is perhaps not worth while to introduce further inconsistency into the nomenclature of formal grammar by insisting that the *si*-clause be not called "explanatory" or "explicative", though there is no other warrant for the use of these terms than the unfortunate application of the same to analogous *quod*- and *cum*-clauses which they fit as little as they do the *si*-clauses under discussion; take for instance:

Cic. in Verr. II. 2. 6. 16:

Videor mihi gratum fecisse Siculis, quod eorum iniurias ... sum persecutus.

In this sentence clearly it is the subject-matter of the *quod*-clause on which judgment is passed; the thought order must be "My prosecution of their wrongs is, I think, pleasing to the Sicilians". Sentences in which are found such *si*-, *quod*- and *cum*-clauses deserve, in grammar, a distinctive name descriptive of the nature of the underlying thought.

On the other hand grammar may be said to be justified in applying, in a rather mechanical way, the terms "explanatory" and "explicative" to any *si*-clause (whatever the mode of conditional thought) that is anticipated by some particular word or words in a preceding apodosis; e. g.:

Livy XXI. 17. 6:

Cum his ... copiis Ti. Sempronius missus in Siciliam, *ita* in Africam transmissurus, si ad arcendum Italia Poenum consul alter satis esset.

The only example at hand where there is such anticipation of the conditioning clause when the underlying thought is a Conditional-Defining Period chances to be one in which the conditioning concept-group finds expression in the infinitive:

Plaut. Bacch. 97 ff.:

ego opsonabo; nam *id* flagitium meum sit, mea te gratia
et operam dare mi et ad eam operam facere sumptum de tuo.

I have said just above that it is in a rather mechanical way that grammar may apply the names "explanatory" and "explicative" to *si*-clauses that are anticipated in apodosis in this way. For such an arrangement of the sentence does not by any means signify that the *si*-clauses expresses a concept-group that occurs to the mind after the thought of the apodosis is worked out; when the thought-period is of the Conditional-Defining variety this would hardly ever be the case, and in other thought-periods (cf. the passage just quoted from Livy) the fact that in speech the condition is anticipated shows that the conditioning concept-group is already present in the mind; in the thought-period it may have either preceded or followed. The range of words

the fact that the sentences are written, not spoken, is much less of a disadvantage. There are of course complicated cases, but often it is simply a question of noting the subject-matter of protasis and apodosis and the relation that these two subject-matters would naturally sustain to one another. Here again all conditional sentences that are not really the expression of conditional thought must be thrown out; most of the others classify readily according to the mode of the underlying thought. The relation between the subject-matter of the protasis and that of the apodosis is sometimes so obvious that it is surprising that the matter has not attracted more attention; there are, however, sporadic references that show that it has not escaped notice altogether. E. g., Lindskog[1] heads one of his sections as follows, "Vis causalis sententiae condicionali subest", quoting such examples as

Plaut. Amph. 857:

> Abin hinc a me, dignus domino servos?—Abeo, si iubes.

Plaut. Asin. 460:

> Non magni pendo; ne duit, si non volt.

In terms of the present paper, the thought suggested by such sentences as these is Conditional-Causal.[2]

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and phrases that may anticipate a following conditional clause is somewhat wider than seems generally noted; e. g.:

Cic. ad Att. II. 22. 5:

sed totum est in *eo*, si antequam ille ineat magistratum (sc. te videro.)

Cic. p. Sest. 10. 24;

Foedus fecerunt cum tribuno pl. palam, ut ab eo provincias acciperent, quos ipsi vellent ... *ea lege*, si ipsi prius tribuno pl. adflictam ... rem publicam tradidissent.

Pliny Ep. IV. 13. 7:

Huic vitio occurri *uno remedio* potest, si parentibus solis ius conducendi relinquatur.

Cf. Cic. Lael. 17. 64, Caes. B. G. III. 5, Livy XXI. 10. 4.

[1] De enuntiatis apud Plautum et Terentium condicionalibus, Lundae, 1895, p. 83 ff. Cf. Rothheimer, De enuntiatis condicionalibus Plautinis, Göttingen, 1876, Chap. I (and his reference to Holtze), Reisig, Vorlesungen über lateinische Sprachwissenschaft, Berlin, 1888, § 264 ff., and Lane, Lat. Gram. 2065.

[2] In the first of these cases the question might be raised whether the thought to be conveyed is not a causal period rather than a conditional, and I see no objection to such an interpretation, though Lindskog seems to fear it.

In applying the test suggested it will be found that, in dealing with negative expressions, the term "cause" has a somewhat different meaning than in other kinds of sentences, but this adjustment will be readily made. More likely to confuse is the common substitution in language generally of expressions of ability, readiness and the like for e. g., a promise. Such substitutions are not peculiar to the conditional sentence; thus, when we wish to change a piece of money, we commonly say "*Can* you change this?" and the reply "Yes" or "I can" is as commonly taken as an expression of willingness to do so. The writer once witnessed a case of this sort when the first speaker, at the words "I can", confidently held out his money, only to be met with the unexpected addition "but I do not know that I care to part with the change", much to the amusement of the spectators. Examples of this tendency to substitution may be seen in the following conditional sentences:

"I can attend to this for you, if you will wait a moment".
"If you want anything, I am ready" or "at your service".

cp. the following cases taken from Plautus:

Curc. 328:

PH. Perdidisti me. CV. Invenire *possum*, si mi operam datis.

Ep. 448 ff.:

sed istum quem quaeris Periphanem† Platenium
ego sum, siquid vis.

Merc. 287 ff.:

Quamquam negotiumst, siquid veis, Demipho,
non sum occupatus umquam amico operam dare.

Mil. 972:

cupio hercle quidem, si illa volt.

In cases like this the speaker says less than he means and less than the hearer understands him to mean; in seeking to determine the mode of conditional thought that is suggested to the hearer we must of course deal with the real meaning of the apodosis. In the same way must be treated sentences like the following:

"If you want me, I shall be at the bank".

Here again the speaker means more than he says; the hearer

gathers from the scant verbal expression what he would gather from

"If you want me, come to the bank; I shall be there."[1]

We must treat the sentence in this way, for in the original form the two parts are not protasis and apodosis. One other source of confusion that crops out insidiously is the fact that many *si*-clauses are concessive rather than purely conditional in function; when this is true, there is an adversative relation between the subject-matter of protasis and apodosis not treated in this paper.

These remarks on the difficulties met in trying to determine the mode of conditional thought underlying given conditional sentences are merely general suggestions; further particulars would naturally be added in a detailed discussion of concrete sentences. Calling for special treatment are idioms like *miror si* and sentences that contain *si* in the sense of "on the chance that".

6

Unreal Conditional Periods.

Any conditional thought-period referring to the time realms of the existent or the past differs from an unreal conditional thought-period only in this that its concept-groups are colored by a lack of assurance about realization in fact, while those of the corresponding unreal period are permeated by the assurance of *non*-realization in fact. Consequently the variety seen in the act of intellection that binds together the concept-groups of conditional thought-periods generally may be observed also in periods of this class. The following sentences would be natural expressions for unreal thought-periods exhibiting the different modes of conditional thought;

(a). Conditional-Causal.

"If he had done wrong, he would be punished".

(b). Conditional-Circumstantial.

"If he had come home, he would be punished".

[1] This fuller form is rarer than the other; there is a very good case in Plautus, Mil. 480.

(c). Conditional-Inferential.

"If the flowers were fresh, it would follow that it rained last night".[1]

(d). Conditional-Defining.

"If he were doing that, it would be a shame".

Taking up a mass of syntax material, some unreal conditional sentences like these will be found—sentences designed to convey to the hearer the bare information that something would follow from circumstances that do or did not exist. But a very large number are not (at least primarily) the expression of conditional thought at all. This has come about very naturally from the fact that when the speaker utters the clauses of an unreal conditional sentence, the hearer cannot well help thinking of the corresponding realities; e. g., when I say "If I had been present", the hearer invariably infers that I was not there. A speaker often takes advantage of this state of affairs, and makes use of an unreal conditional sentence as a mere roundabout way of suggesting to the hearer (a) the cause of an existing or past state of affairs or (b) the ground from which an existing or past state of affairs may be assumed.

(a). Suggests a Cause.

Suppose A says to B "You ought to have invited C". This suggests to B's mind the reason why C has not been invited, and he might thus express his thought;

"I have not invited him, because he offended me".

Yet, with precisely the same thought to convey, he would be quite as apt to say

"I should have invited him, if he had not offended me".

This form of expression is available for the conveyance of his thought because the hearer will instantly extract from "if he had not offended me" the information "he offended me", and the general circumstances under which the words are spoken, along with the speaker's tone and manner, show clearly that this is the

[1] The English idiom demands the periphrasis in the unreal conditional sentence; elsewhere it is optional. Thus we may say either "If the flowers are fresh, it rained last night" or "If the flowers are fresh, it follows that it rained last night".

reason that C has not been invited—this last being a fact already known to A, but also in addition implied by "I should have invited him". Such a conditional sentence is not really the expression of conditional thought at all; its function is to tell A why C has not been invited. To take another illustration, suppose that A says to B "These goods are inferior"; B replies

"If you had provided skilled workmen, they would have been satisfactory".

Here again the unreal conditional sentence is but a tool to suggest to the hearer the reason for the state of affairs to which he has called attention—he is told that it was his own lack of interest in providing proper workmen that accounts for the unsatisfactory grade of the goods in question.

(b). Suggests the Ground of an Inference.

Suppose again that a general advancing to the relief of an officer whom he has left with directions to keep a certain signal flying, at the cost of his life, if need be, catches sight of the town and notes that the flag is not flying; he at once infers from this the death of his officer. Someone who does not know about the order for the display of the signal might call for an expression of this intellection by asking whether he (the general) thought his officer safe. The latter could express his thought directly by by saying

"No; (for) the flag is down".

Or, more fully,

"No, he is dead; (for) the flag is down".

To convey the same thought he would however be quite as apt to say

"No; (for) if he were safe, the flag would be up".

This last form of speech is a clear expression for the thought because the words "the flag would be up" instantly calls the hearer's attention to the real state of affairs—that the flag is down; the circumstances under which the words are spoken show that this is the ground from which the speaker infers the death of his officer, which inference (already known to the hearer) is implied in "if he were safe".

Other examples of the same use of the unreal conditional sentence are; "Did it rain last night?"

"No; for the ground would be wet, if it had rained last night".

Again, "Is he within?"

"No; for we should hear talking, if he were within".

The fact that sentences such as these are being used as a roundabout form of expression for thought that is not really conditional sometimes produces curious and (possibly) hybrid forms of speech; e. g., the thought of the last example might produce

"No, he is not within; for we should hear talking".[1]

This form of verbal expression states the inference in so many words, and implies the ground of the inference. It is possible that such a sentence should be treated as a sort of compromise between two regular ways of expressing the same thought, namely

"No, he is not within; for we do not hear talking".
"No; for if he were within, we should hear talking".

These two special uses of the unreal conditional sentence are easily distinguished from the use of the same verbal form to express real conditional thought, for in the latter case the speaker's point of view is what would be if things were not (or had not been) as they are (or were), e. g., he forecasts the outcome of circumstances that do or did not exist. This is obviously not the case with such a sentence as e. g.,

"I should have invited him, if he had not offended me".

Even without making any formal analysis whatever the reader feels instinctively, from the circumstances under which the words are spoken, that the speaker is explaining or defending his course of action, and that this explanation is the real information conveyed to the hearer. It is noteworthy that these two rhetorical uses of the unreal conditional sentence are well established as early as Plautus.[2] The second (suggesting the ground of an inference) is a striking feature of the diction of the first book of Lucretius; e. g.,

1. 159 ff.:

Nam si de nilo fierent, ex omnibu' rebus
Omne genus nasci posset, nil semine egeret.

cf. 180, 213, 217, 239, 335, 342, 356, etc.

[1] Cf. Plautus, Cas. 910.

[2] The facts of Plautus' usage are recorded in the American Journal of Philology, Vol. XXII. p. 310 ff. It is there shown how our instinctive feeling for these rhetorical uses lies at the basis of our judgment that many conditional sentences that use the present subjunctive deserve the name "unreal".

Elsewhere[1] I have noted the interesting fact that, in Cicero's Orations, nearly all of the unreal conditional sentences with the imperfect subjunctive in the protasis and the pluperfect in the apodosis (a hard combination) may be explained by observing that the imperfect subjunctive in the unreal condition may refer to a time realm as wide as does a general truth, e. g., "If black were white" (such a phrase being so to speak, both present and past unreal all at once), while the pluperfect of the apodosis may refer to the same time realm as the perfect definite of the indicative mood, e. g., "I should have known (and should now know)", thus being a sort of combination past and present unreal; and further, that the remaining cases are conditional sentences used in the second of these two special ways (suggesting the ground of an inference); the passages are in Verr. II. 3. 39, 89, II. 3. 58. 134, II. 5. 51. 133, p. Mur. 14. 32, p. Arch. 7. 16, p. Cael. 6. 14, p. Planc. 22. 53, p. Mil. 17. 45. Other examples may be found in Cicero outside of the Orations; e. g.,

Lael. 4. 13:

> . . . qui mortuis tam religiosa iura tribuerunt, quod non fecissent profecto, si nihil ad eos pertinere *arbitrarentur*.

It certainly seems that this peculiar use of the imperfect subjunctive—referring flatly, as it does, to the past—must find its explanation in the special rôle which the unreal conditional sentence is playing as the expression of a quite different class of thought; that the two things go hand in hand so often must be something more than a coincidence. Beyond this I make no special claim, though (l. c.) I have suggested one way in which the nature of the thought to be conveyed might have affected the choice of tense. The current explanation of the use of the imperfect subjunctive in the protasis of conditional sentences of this type, namely that the reality to which the clause is opposed is a continuous state, sounds like an echo of Greek grammar, and needs at least to be very carefully stated if it is to cover such cases as

p. Mil. 17, 45:

> quem diem ille, quam contionem, quos clamores, nisi ad cogitatum facinus *adproperaret*, numquam reliquisset.

Here (as the context shows) the reference is to a single act on a

[1] Amer. Jour. Phil. XXI. p. 264 ff.

definite day in the life of Clodius, who is now dead. A case like this should perhaps predispose us to seek some explanation that is based on the function of the sentence as a whole—some such explanation as that offered in the article in the American Journal of Philology above referred to; additional support for that explanation is afforded by

Sallust, Cat. LII. 19:

> Nolite existumare maiores nostros armis rem publicam ex parva magnam *fecisse*. Si ita res *esset*, multo pulcherrumam eam nos haberemus.

7.

THE GENERAL "CONDITION".

The heading of this section reads general "condition" because the point of view is the speaker's intellection. Some would write it "general" condition, and there is some justification for that phrasing from the point of view of the hearer; for he at times cannot read the idea of repeated action into the protasis until he reaches the verbal indication of the same in the apodosis. When I say general "condition" I mean to raise the question whether the thought which underlies a protasis that refers to a repeated action is really a conditioning concept-group. For the characteristic thing about a conditioning concept-group is its lack of assurance concerning realization in fact—the speaker is not sure that the thing in question will happen (has happened, etc.) but in a course of thought that we would be apt to express by

> "If he saw a soldier fighting bravely, he always rewarded him"

the speaker knows that the action referred to in the protasis did happen, at least occasionally, a fact which receives due recognition in another form we sometimes use under the same circumstances;

> "When(ever) he saw a soldier fighting bravely, he always rewarded him".

Looking at the question from the point of view of psychology it would certainly seem that the second of these forms is the wholly unexceptional expression for the speaker's intellection, and that the use of a conditional particle in such a case calls for explanation. Unfortunately for Latin syntax, the literature of that language begins too late to show whether the Roman mind

originally experienced a jar when the conditional particle was so used; in Plautus the problem of verbal expression is already worked out almost (if not quite) as completely as at a later period, the *si*-clause being perhaps the prevailing form, though such relative words as *qui* and *ubi* appear not infrequently. But Greek literature began early enough to show clearly that the Greek mind attacked the problem along exactly the lines we should expect from the psychological considerations above noted; for the normal early form of verbal expression is a clause introduced by a relative word like ὅτε, whereas the wide use of εἰ (and ἐάν) in the classical period is a distinct intrusion on the part of those particles. This is manifest from the statement of Goodwin (Greek Moods and Tenses, § 462 ff.), who says that in Homer the subjunctive of the present general condition (his term is "supposition") is introduced by a conditional particle but nineteen times, and the optative of the past but once—this too in spite of the fact that Homer has very frequent occasion to express the type of thought under discussion (cf. l. c. § 538). But these figures given by Goodwin may be further cut down in dealing with the problem in hand, for of the nineteen cases of the present subjunctive quoted by him, at least fourteen are *concessions*, differing not at all from ordinary concessions except for the fact that they refer to a repeated act. The introductory word in these cases is not εἰ, strictly speaking; it is εἴ περ (Od. i. 166 ff., Il. i. 81 ff., iii. 25 ff., iv. 261 ff., x. 225 ff., xi. 116 ff., xii. 302 ff., xvi. 263 ff., xxi. 576 ff., xxii. 191 ff.), καὶ εἰ . . . περ (Il. xi. 391 ff.), εἰ . . . καὶ (Od. vii. 204 ff.), and καὶ εἰ (Od. xvi. 97 ff. = 115 ff.); in four of these passages the concessive force is still further accentuated by the presence of ἀλλά in the apodosis (Il. i. 81 ff., x. 225 ff., xxi. 576 ff., xxii. 191 ff.). It might be added that the single case of εἰ and the optative cited as a past general condition also has ἀλλά in its apodosis. Concessive clauses should not be counted in the present discussion, for a concessive clause in Greek (as in Latin and English) refers indifferently to something of whose realization in fact the speaker is not assured or to something of which he is sure; an instance of the latter is

Soph. Oed. Tyr. 302 ff.:

> πόλιν μέν, εἰ καὶ μὴ βλέπεις, φρονεῖς δ' ὅμως
> οἵᾳ νόσῳ σύνεστιν.

When the speaker here says "though you cannot see" in addressing the blind and aged seer, he refers to a patent and obvious fact. There is therefore nothing noteworthy in the fact that the concessive εἴ περ, καὶ εἰ, etc., of the Homeric examples above quoted introduce clauses that refer to an action that the speaker is assured does happen at least occasionally. But from the Greek point of view manifestly *conditional* εἰ had to swerve from its proper function to be used under like circumstances; that it did so swerve is abundantly attested by the language of the classical period; e.g.,

Eur. Alc. 671:

Ἦν ἐγγὺς ἔλθῃ θάνατος, οὐδεὶς βούλεται θνῄσκειν.

The problem in hand is to determine whether, in Homer, conditional εἰ had begun to overstep its bounds, threatening the hitherto undisputed reign of ὅτε and other relative words in sentences of the type just quoted (Eur. Alc. 671). Throwing out, then, the fourteen or fifteen[1] concessive sentences above referred to, there remain but five or six passages in which to find examples of conditional εἰ overstepping its proper bounds. These latter figures give a truer impression of the disparity between the use of Homer and that of the classical period than does the original statement quoted from Goodwin.

It may be even questioned whether putting the figure at five or six is not making it too large. Ameis rejects Od. xi. 158 ff. as spurious (not, however, with reference to the use with which we are dealing), and Il. xii. 238 ff. is certainly peculiar:

Τῶν οὔ τι μετατρέπομ' οὐδ' ἀλεγίζω,
εἴ τ' ἐπὶ δεξί' ἴωσι πρὸς ἠῶ τ' ἠέλιόν τε
εἴ τ' ἐπ' ἀριστερὰ τοί γε ποτὶ ζόφον ἠερόεντα.

The meaning of εἰ in this passage hardly looks toward "when" or "whenever"; rather it verges toward the indirect question; for "I care not for them, whether they go to the right or the left" is but a step removed from "I care not whether they go

[1] It should perhaps not be insisted that Il. xxiv. 768 ff. is concessive, though the ἀλλά in the apodosis looks in that direction; the sentence however is involved, and there may have been a shift of the point of view by the time the apodosis was reached.

to the right or the left". The three remaining cases not yet cited are Od. xii. 95 ff., xiv. 372 ff., Il. i. 166 ff.; it is noteworthy that the conditional word in each of these passages is accompanied by an indefinite (εἴ ποθι, εἰ μή που, ἤν ποτε). Showing thus as it does the very beginnings of the process, Greek literature affords a very interesting field for the study of the causes that led to the intrusion of the conditional particle into the realm of various relative words of that language.

UNIVERSITY OF CALIFORNIA. H. C. NUTTING.